REMARKS

Initially, in the Office Action the Examiner has rejected claims 1 – 6 under 35 U.S.C. §101. Claims 1 – 12 have been rejected under 35 U.S.C. §103(a) as being unpatentable over U.S. Patent No. 7,076,005 (Willenegger) in view of U.S. Patent No. 5,694,414 (Smith et al.).

By the present response, Applicant has cancelled claims 1 – 5 without disclaimer and amended claim 6 to further clarify the invention. Claims 6 – 12 remain pending in the present application.

Teleconference regarding proposed claim amendments

It is noted that a teleconference was held on February 11, 2009 between the Examiner and Steven Phillips regarding proposed claim amendments to put this case in condition for allowance. Since a new Office Action was issued with no mention of these claim amendments, it is assumed that they were not entered.

35 U.S.C. §101 Rejections

Claims 1 – 6 have been rejected under 35 U.S.C. §101. Applicant has cancelled claims 1 – 5, therefore, rendering these rejections moot and has amended claim 6 to further clarify the invention. Accordingly, Applicant respectfully requests that these rejections be withdrawn and that claim 6 be allowed.

35 U.S.C. §103 Rejections

Claims 1 – 12 have been rejected under 35 U.S.C. §103(a) as being unpatentable over Willenegger in view of Smith et al. Applicant respectfully traverses these rejections.

Smith et al. discloses a technique for spread-spectrum communication which uses more than one mode and more than one frequency band. Selectable modes include narrowband mode and spread-spectrum mode, or cellular mode and microcellular mode. Selectable frequency bands include both licensed and unlicensed frequency bands, particularly frequency bands including the 902-928

MHz, 1850-1990 MHz, and 2.4-2.4835 GHz frequency bands. Spread-spectrum communication channels are 10 MHz or less in width. The frequency band onto which spread-spectrum signals are encoded may be changed upon a change in environment or other control trigger, such as establishment or de-establishment of communication with a private access network. A multi-band transmitter comprises a single frequency synthesizer and a frequency source (e.g., a local oscillator), coupled to a selectable band pass filter. A multi-band receiver capable of monitoring one or more frequency bands comprises bank of bandpass filters and a demodulator comprising a single frequency synthesizer and a frequency source.

Regarding claims 1, 6, 7, and 12, Applicant submits that none of the cited references, taken alone or in any proper combination, disclose suggest or render obvious the limitations in the combination of each of the claims of the present application. For example, Applicant submits that none of the cited references disclose or suggest decoding the inband bit portion of a received frame to obtain confidence levels associated with each of the M codec modes before a decoding error has been detected and decoding the speech portion of the received frame using the chosen speech codec method. The Examiner asserts that these portions are disclosed in Willenegger at Column 1, lines 62 – 67 and Column 5, lines 25 – 67. However, these portions merely disclose that in explicit detection schemes, the transmitter provides the receiver with information that identifies the particular transmission format used in the encoding process and the receiver decodes the received information assuming that the transmission format is the one indicated by the transmitter, details regarding the plurality of permissible formats being prioritized and that the prioritized order does not include the received transmission format since it has been demonstrated that this format does not result in a successful decoding, and that a metric is determined for each of the plurality of permissible formats that reflects the probability measured that the permissible format is the transmission format that was used to encode the received frame. This is not <u>decoding the inband bit portion of a received frame to obtain confidence levels associated with each of the M codec modes</u>, and

decoding the speech portion of the received frame using the chosen speech codec modes, as recited in the claims of the present application. Willenegger merely discloses determining the transmission format that was used to encode the received frame from a number of permissible formats based on a probability and decoding the received frame using the determined format. Willenegger nor Raith et al. disclose or suggest both decoding the inband bit portion of a received frame to obtain confidence levels associated with each of the M codec modes and then decoding the speech portion of the received frame using the chosen speech codec mode.

Moreover, none of the cited references disclose or suggest ordering the confidence levels from highest to lowest representing a most likely codec mode to a least likely codec mode, respectively, before a decoding error has been detected based upon a Euclidian distance measure, as recited in the claims of the present application. Neither Willenegger nor Raith et al. disclose or suggest ordering the confidence levels representing a most likely codec mode to a least likely codec mode based upon a Euclidian distance measure.

Moreover, Willenegger discloses that two subchannels over each transmission interval are encoded as a frame along with a TFCI that identifies the particular combination of format used to encode the frame, where multiple transmission formats may be used for each subchannel and be different between the subchannels where each subchannel is encoded with a particular format and the encoded data from both subchannels combined to form the frame for a particular time interval along with the TFCI identifying the combination format. This is not decoding the inband bit portion of a received frame to obtain confidence levels associated with each of the (M) codec modes before a decoding error has been detected, as recited in the claims of the present application. These portions merely disclose that two subchannels may be encoded with different formats and a TFCI identifies the combination of formats used for the encoding.

Further, Applicant submits that none of the cited references disclose or suggest decoding the speech portion of the received frame using the chosen

speech codec mode, the decoding comprising a recursive convolutional decode. The Examiner admits that Willenegger fails to disclose or suggest these limitations but asserts that Smith et al. discloses these limitations in Column 13, lines 10 – 12. However, these portions merely disclose that a receiver independently de-spreads the three signals received from at least three bay stations, performs soft decision data and modulation, and combines the data streams prior to convolutional decoding. This is not <u>decoding the speech portion of a received frame</u> using the chosen speech codec mode, <u>the decoding comprising a recursive convolutional decode</u>, as recited in the claims of the present application. Smith et al. does not disclose or suggest <u>decoding a speech portion of a received frame</u>. Further, Smith et al. does not disclose or suggest the decoding comprising <u>a recursive convolutional decode</u>. The mere disclosure in Smith et al. of a receiver combining the data streams of three signals prior to convolutional decoding does not disclose or suggest these limitations in the claims of the present application. [check prior response to see if additional info should be added here][add word "resumed decoding comprising a recursive convolutional decode"]

Regarding claims 8 – 11, Applicant submits that these claims are dependent on one of independent claims 7 and, therefore, are patentable at least for the same reasons noted previously regarding these independent claims.

Accordingly, Applicant submits that none of the cited references, taken alone or in any proper combination, disclose, suggest or render obvious the limitations in the combination of each of claims 6 – 12 of the present application. Applicant respectfully requests that these rejections be withdrawn and that these claims be allowed.

Conclusion

In view of the foregoing amendments and remarks, Applicant submits that claims 6-12 are now in condition for allowance. Accordingly, early allowance of such claims is respectfully requested. If the Examiner has any questions about the present Amendment or anticipates finally rejecting any claim of the present application, a telephone interview is requested. If necessary, please charge any additional fees or credit overpayment to Deposit Account No. 13-4365.

Respectfully submitted,

Phillip Marc Johnson
(Applicant)

Date: April 9, 2009

Frederick D. Bailey
Attorney for Applicant
Registration No. 42,282
Moore & Van Allen PLLC
430 Davis Drive, Suite 500
PO Box 12706
Research Triangle Park, NC 27560
Telephone: (919) 286-8000
Facsimile: (919) 286-8199